ORIGINAL CLAIMS (AMENDMENT A MARKINGS)

currently amended as 1A

I Claim:

CURRENTLY AMENDED

1. A coriolis inertial oscillator consisting of an orbiting mass with radial motion on a moveable platform, said mass rotating at a regulated constant angular velocity, from a motor flywheel, via sliding rigid coupling, the platform constrained to move linearly in a vertical channel parallel to the earth's gravitational field, the channel housed in a rigid frame attached to a payload at the bottom, the oscillating channel is mechanically clutched to the frame via a member when the forces are upward and not exceeding 90 degrees in each rotation with repositioning of the platform from a spring crank mechanism..

1A 1Ae regulation system 1A coupling and release 1Ad 1Af

CURRENTLY AMENDED

2. A system as claimed in 1., where the mechanical clutch is a toggle clamp engaging a grooved member held by a back plate activated by rotary cam engaging follower on toggle arm

CANCELED

3. A system as claimed in 1, where the mechanical clutch is a eccentric cam with lever arm engaging a grooved member with spring release.

CANCELED

4. A system as claimed in 1 where the mechanical clutch is ball in an inclined plane with spring release of ball via slotted lever

1Be

CURRENT-3 AMENDED

5. A system as claimed in 1 where the mechanical clutch is a cam buckle acting on a nylon webbing material member in tension with the frame.

CURRENT 4 AMENDED

6. A system as claimed in 1 where the rotor mass is a satellite mass fixed to a planet gear via arm which revolves around a fixed sun gear via axle connected to gear drive

CURRENT 5 AMENDED 6 1A

7. As claimed in 4 where the distances between the rotor, planet and sun gear are equal

CURRENT-8 AMENDED

8. As claimed in 8 where the satellite mass is zero and the planet gear revolves about the sun with equal mass.

ORIGINAL CLAIMS

CLAIMS - ORIGINAL (AMENDMENT A MARKINGS)

1 1A

CURRENTLY AMENDED 9. A system as claimed in 1 where the platform mass is twice the weight of the combined planet ~~gear~~ satellite and rotor.

CUR. AM. 1Bf 10. A system as claimed in 1. where the flywheel is replaced with a ~~ball~~ mechanical governor

CUR AM 8 11. A system as claimed in 1 where the motor is an induction motor with variable frequency speed control

CUR. AM. 10 12. A system as claimed in 1 where the motor is a rotary wankel engine

CUR. AM. 9 13. A system as claimed in 1 where the motor is a DC electric motor, ~~powered from a fuel cell.~~

CUR. AM. 11 14. A system as claimed in 1 where the slide coupler is a splined shaft with sliding worm engaging a worm gear ~~set~~ 5 to drive rotors.

CUR. AM. 1B-a 15. A system as claimed in 1 where the slide coupler is an oldham coupler connecting the drive source with the oscillator axle

CURRENT/AMEND. + 1Bc 12 16. A system as claimed in 1 comprising multiple oscillators with at least two coaxially coupled by a common oldham coupler, each being clocked 180 degrees apart on independent platforms, driven by the motor oldham coupler; to provide zero transverse forces

CUR. AM. 1B-c 17. A system as claimed in 16 with four oscillators clocked 90 degrees appart, each independently oscillating from common oldham couple motor drive source.

CUR. AM. 14 18. A system as claimed in 16 where the spring-crank repositioning device is driven by a chain drive and sprocket arrangement off a sprocket of equal size rotatably connected to the oldham..

CURRENT AMENDED CLAIMS (A)
— CLEAN COPY —

I claim: LINE

currently AMENDED 1. A method for an inertial oscillator control system comprising 1 2

A. a near vertical lifting system for heavy gravity payloads in a first embodiment: 3 4

a) utilizing the compound action of coriolis-centrifugal forces in a three body variable radius oscillator , 5 6 7

b) torque supply source comprising sliding gear arrangement 8 9

c) moveable platform that carries force generating bodies rotating about respective axles, 10 11

d) coupling and release of platform with rigid load rod connected to frame for angular durations less than 90 degrees of planet rotor, 12 13 14

e) while maintaining constant angular velocity of of rotor bodies by a regulation system, 15 16

f) maintaining an elevation position of platform in gravity field using spring-crank mechanism, and 17 18

g) vectoring platform-frame off from vertical to obtain horizonal motion of payload, 19 20

h) and a motor drive source of high torque design. 21

currently Amended B, a near vertical lift system for gravity pAyload in a second embodiment, 22 23

Current Amend a) a rotary torque source using an oldham coupler,

New b) driving a two body oscillator consisting of a plat form with single rotor,

current amend c) in a coaxial arrangment of multiple oscillators with each rotor clocked 180 dggrees apart from each other,

New d) that co-rotate in one direction to provide a net gyroscopic moment to stabalize vehicle once in the air,

Current amend e) a heavy duty clutching system using ~~a cam buckle~~ load member acting on ~~nylon webbing~~ means in tension connection with the frame,

Current Amend f) a speed regulation design using a mechanical governor

New g) and a motor source with high torque.

but otherwise having the same controls as the 1st embodiment.

currently Amended 2. A system as in claim 1 where the mechanical clutch is a toggle clamp acting on a groved load rod with backup plate and activated by rotary cam engaging a follower on toggle arm and release from a second rotating pin on separate axis.

currently amended 3. A system as in claim 1 with a mechanical clutch using a cam buckle acting on a nylon webbing in tension with the frame.

current amend

4. A system as in claim 1A, where the rotor mass is a satelitte mass fixed to a planet gear via arm which revolves around a fixed sun gear via axle connected to gear drive

current AMEND

5. A system as in claim 1A where the distances between the respective masses are equal.

current AM.

6. A system and in claim 1A where the satelitte mass is zero and the just the planet rotor revolves about the sun gear axle.

current AMEND

7. A system as in claim 1A where the platform mass is equal to twice the mass sum of the planet and satellite rotors.

CURRENT AMEND

8. A system as in claim 1A where the motor is an AC inductioon motor.

current AMEND

9. A system as in claim 1A where the motor is a DC electric motor.

CURRENT AMEND

10. A system as in claim 1B where the motor is a rotary wankel engine.

current AMEND

11. A system as in claim 1A where the drive is a splined shaft with slidable worm acting on worm gears to drive rotors.

New

12. A system as in claim 1A where at least two oscillator units are paired in a frame to provide zero transverse forces and multiple pulses of thrust per rotation.

New

13. A system as in claim 1 where the frame is mounted above the payload in gimbal fashion to permit vectoring for horizonal thrust.

currently mended

14. A system as in claim 1B where the drive is a pair of chain sprockets clocked in synchronous operation with the motor and crank spring reset system and rotor main drive axle.